

[0006] It is the objective of the invention to ~~disclose~~ provide a cargo deck of the kind cited at the outset that is designed so as to achieve a simplification of the assembly process, accompanied by simplified construction and low weight.

[0007] According to the present invention there is provided ~~This objective, in the case of~~ a cargo deck to receive a load in an aircraft cargo compartment comprising ~~that comprises~~ a plurality of ball mats, floor panels or similar flat floor elements, and plus a plurality of roller conveyors or similar profile elements mounted in the long direction of the aircraft to receive transport rollers, PDUs, latches or similar functional units to move the load and fix it in position on the cargo deck, ~~is achieved in that~~ the floor elements, at least in sections, being ~~are~~ firmly connected to the profile elements so as to form a deck section that extends across the entire width of the cargo compartment, so that longitudinal forces introduced in particular by the load, and hence imposed on the deck section in the direction of an aircraft long axis and acting as shear forces in the surface direction of the cargo deck, can be transmitted to outer edges of the deck section and dissipated from there to an outer skin (12) of the aircraft.

[0008] ~~An essential idea~~ A basis of the invention resides in the fact that the flat elements which are present in any case, namely the floor panels on which one can walk and/or the ball mats, together with the profile elements, which are also present in any case and in which are mounted the rollers to form roller conveyors as well as the latches and PDUs - all of which are initially intended to support vertical loads - now are connected so that as a whole they form a structural component that is stable and/or stiff with respect to shear forces (acting in the surface direction) and that because of this shear-force resistance is capable of transmitting